Keyword Index

absolute regularity; asymptotically normal statistics; Berry-Esseen bounds; functionals of empirical distribution functions; functions of sample means; linear combinations of order statistics; mixing; studentized means; U-statistics; weakly dependent random variables; 329

adaptivity; ergodicity; local asymptotic normality; semi-parametric time series; stationarity; 247

Akaike information criterion; AR(X); ARMA; autoregressive approximation; autoregressive spectrum; blockwise bootstrap; linear process; resampling; stationary sequence; threshold model; 123

AR(X); ARMA; autoregressive approximation; autoregressive spectrum; blockwise bootstrap; linear process; resampling; stationary sequence; threshold model; Akaike information criterion; 123

ARMA; autoregressive approximation; autoregressive spectrum; blockwise bootstrap; linear process; resampling; stationary sequence; threshold model; Akaike information criterion; AR(X); 123

asymptotic confidence intervals; asymptotic mean square errors; least-square estimators; tail index; universal asymptotic normality; 351

asymptotic mean square errors; least-square estimators; tail index; universal asymptotic normality; asymptotic confidence intervals; 351

asymptotically normal statistics; Berry-Esseen bounds; functionals of empirical distribution functions; functions of sample means; linear combinations of order statistics; mixing; studentized means; U-statistics; weakly dependent random variables; absolute regularity; 329

autoregressive approximation; autoregressive spectrum; blockwise bootstrap; linear process; resampling; stationary sequence; threshold model; Akaike information criterion; AR(X); ARMA; 123

autoregressive spectrum; blockwise bootstrap; linear process; resampling; stationary sequence; threshold model; Akaike information criterion; AR(X); ARMA; autoregressive approximation; 123

Bayes problem; Brownian motion; change point; sequential detection; tests of power one; 457

Berry-Esseen bounds; functionals of empirical distribution functions; functions of sample means; linear combinations of order statistics; mixing; studentized means; U-statistics; weakly dependent random variables; absolute regularity; asymptotically normal statistics; 329

Bessel process; Brownian motion; excursion length; Levy's class; 387

bivariate normal; copula models; correlation; coupled differential equations; information; maximum correlation; normal scores; projection equations; rank correlation; semi-parametric model; Sturm-Liouville equations; 55

blockwise bootstrap; linear process; resampling; stationary sequence; threshold model; Akaike information criterion; AR(X); ARMA; autoregressive approximation; autoregressive spectrum; 123

bootstrap; Edgeworth expansion; generalized jackknife; random fields; Richardson extrapolation; strong mixing; undersampling; 149

boundary operator; generator; Lyapunov function; oblique reflection; positive recurrence; recurrence; reflecting diffusions; stopping time; strong Feller property; strong Markov property; transience; 97

boundary value problems; conditional independence; Markov field property; stochastic differential equations; 371 Brownian motion; excursion length; Levy's class; Bessel process; 387

Brownian motion; change point; sequential detection; tests of power one; Bayes problem; 457

change point; sequential detection; tests of power one; Bayes problem; Brownian motion; 457 composition; excursion; local time; random set; renewal; 79

conditional independence; Markov field property; stochastic differential equations; boundary value problems; 371 continuous state space; global random optimization; stationary distribution; 415

copula models; correlation; coupled differential equations; information; maximum correlation; normal scores; projection equations; rank correlation; semi-parametric model; Sturm-Liouville equations; bivariate normal; 55

correlation; coupled differential equations; information; maximum correlation; normal scores; projection equations; rank correlation; semi-parametric model; Sturm-Liouville equations; bivariate normal; copula models; 55

coupled differential equations; information; maximum correlation; normal scores; projection equations; rank correlation; semi-parametric model; Sturm-Liouville equations; bivariate normal; copula models; correlation; 55

coupling; Dirichlet distribution; Ewens sampling formula; GEM distribution; Poisson approximation; Poisson-Dirichlet distribution; Stein-Chen method; total variation metric; 225

diffusion process; minimax bound; nonparametric estimation; 445

Dirichlet distribution; Ewens sampling formula; GEM distribution; Poisson approximation; Poisson-Dirichlet distribution; Stein-Chen method; total variation metric; coupling; 225

Keyword Index 493

dual geometry; dual parallel transport; efficient score function; estimating function; Hilbert fibred structure; m-curvature free; semi-parametric model; 29

dual parallel transport; efficient score function; estimating function; Hilbert fibred structure; m-curvature free; semiparametric model; dual geometry; 29

Edgeworth expansion; generalized jackknife; random fields; Richardson extrapolation; strong mixing; undersampling; bootstrap; 149

efficient score function; estimating function; Hilbert fibred structure; m-curvature free; semi-parametric model; dual geometry; dual parallel transport; 29

ergodicity; local asymptotic normality; semi-parametric time series; stationarity; adaptivity; 247

estimating function; Hilbert fibred structure; m-curvature free; semi-parametric model; dual geometry; dual parallel transport; efficient score function; 29

estimation of a density and its derivatives; projection methods; kernel estimators; Fourier series; semi-parametric Cramer-Rao bound; 181

Ewens sampling formula; GEM distribution; Poisson approximation; Poisson-Dirichlet distribution; Stein-Chen method; total variation metric; coupling; Dirichlet distribution; 225

excursion; local time; random set; renewal; composition; 79

excursion length; Levy's class; Bessel process; Brownian motion; 387

exponential dispersion model; Levy-Khinchine representation; Levy measure; natural exponential family; regular variation; Tweedie family; 213

extremal limits; self-similar Markov processes; weak convergence; 479

finite sample; inequality; nuisance parameters; spread; 323

Fourier series; semi-parametric Cramer-Rao bound; estimation of a density and its derivatives; projection methods; kernel estimators; 181

functional limit theorems; round-off errors; stochastic differential equations; 1

functionals of empirical distribution functions; functions of sample means; linear combinations of order statistics; mixing; studentized means; U-statistics; weakly dependent random variables; absolute regularity; asymptotically normal statistics; Berry-Esseen bounds; 329

functions of sample means; linear combinations of order statistics; mixing; studentized means; U-statistics; weakly dependent random variables; absolute regularity; asymptotically normal statistics; Berry-Esseen bounds; functionals of empirical distribution functions; 329

GEM distribution; Poisson approximation; Poisson-Dirichlet distribution; Stein-Chen method; total variation metric; coupling; Dirichlet distribution; Ewens sampling formula; 225

generalized jackknife; random fields; Richardson extrapolation; strong mixing; undersampling; bootstrap; Edgeworth expansion; 149

generator; Lyapunov function; oblique reflection; positive recurrence; recurrence; reflecting diffusions; stopping time; strong Feller property; strong Markov property; transience; boundary operator; 97

global random optimization; stationary distribution; continuous state space; 415

Hankel matrix; mixture models; order esitmation; penalization; 279

Hilbert fibred structure; m-curvature free; semi-parametric model; dual geometry; dual parallel transport; efficient score function; estimating function; 29

i.i.d. random variables; large order statistics; zero-one law; 429

inequality; nuisance parameters; spread; finite sample; 323

information; maximum correlation; normal scores; projection equations; rank correlation; semi-parametric model; Sturm-Liouville equations; bivariate normal; copula models; correlation; coupled differential equation; 55

kernel estimators; Fourier series; semi-parametric Cramer-Rao bound; estimation of a density and its derivatives; projection methods; 181

large order statistics; zero-one law; i.i.d. random variables; 429

least-square estimators; tail index; universal asymptotic normality; asymptotic confidence intervals; asymptotic mean square errors; 351

Levy measure; natural exponential family; regular variation; Tweedie family; exponential dispersion model; Levy-Khinchine representation; 213

Levy's class; Bessel process; Brownian motion; excursion length; 387

Levy-Khinchine representation; Levy measure; natural exponential family; regular variation; Tweedie family; exponential dispersion model; 213

linear combinations of order statistics; mixing; studentized means; U-statistics; weakly dependent random variables; absolute regularity; asymptotically normal statistics; Berry-Esseen bounds; functionals of empirical distribution functions; functions of sample means; 329

494 Keyword Index

linear process; resampling; stationary sequence; threshold model; Akaike information criterion; AR(X); ARMA; autoregressive approximation; autoregressive spectrum; blockwise bootstrap; 123

local asymptotic normality; semi-parametric time series; stationarity; adaptivity; ergodicity; 247

local time; random set; renewal; composition; excursion; 79

Lyapunov function; oblique reflection, positive recurrence; recurrence; reflecting diffusions; stopping time; strong Feller property; strong Markov property; transience; boundary operator; 97

m-curvature free; semi-parametric model; dual geometry; dual parallel transport; efficient score function; estimating function; Hilbert fibred structure; 29

Markov field property; stochastic differential equations; boundary value problems; conditional independence; 371

maximum correlation; normal scores; projection equations; rank correlation; semi-parametric model; Sturm-Liouville equations; bivariate normal; copula models; correlation; coupled differential equations; information; 55

minimax bound; nonparametric estimation; diffusion process; 445

mixing; studentized means; U-statistics; weakly dependent random variables; absolute regularity; asymptotically normal statistics; Berry-Esseen bounds; functionals of empirical distribution functions; functions of sample means; linear combinations of order statistics; 329

mixture models; order estimation; penalization; Hankel matrix; 279

natural exponential family; regular variation; Tweedie family; exponential dispersion model; Levy-Khinchine representation; Levy measure; 213

nonparametric estimation; diffusion process; minimax bound; 445

normal scores; projection equations; rank correlation; semi-parametric model; Sturm-Liouville equations; bivariate normal; copula models; correlation; coupled differential equations; information; maximum correlation; 55 nuisance parameters; spread; finite sample; inequality; 323

oblique reflection; positive recurrence; recurrence; reflecting diffusions; stopping time; strong Feller property; strong Markov property; transience; boundary operator; generator; Lyapunov function; 97 order estimation; penalization; Hankel matrix; mixture models; 279

penalization; Hankel matrix; mixture models; order estimation; 279

penalization schemes; reflections; stochastic differential equations; 403

periodogram; point process; rainfall modelling; spectral analysis; whittle criterion; 301

point process; rainfall modelling; spectral analysis; whittle criterion; periodogram; 301

Poisson approximation; Poisson-Dirichlet distribution; Stein-Chen method; total variation metric; coupling; Dirichlet distribution; Ewens sampling formula; GEM distribution; 225

Poisson-Dirichlet distribution; Stein-Chen method; total variation metric; coupling; Dirichlet distribution; Ewens sampling formula; GEM distribution; Poisson approximation; 225

positive recurrence; reflecting diffusions; stopping time; strong Feller property; strong Markov property; transience; boundary operator; generator; Lyapunov function; oblique reflection; 97

projection equations; rank correlation; semi-parametric model; Sturm-Liouville equations; bivariate normal; copula models; correlation; coupled differential equations; information; maximum correlation; normal scores; 55

projection methods; kernel estimators; Fourier series; semi-parametric Cramer-Rao bound; estimation of a density and its derivatives; 181

rainfall modelling; spectral analysis; whittle criterion; periodogram; point process; 301

random fields; Richardson extrapolation; strong mixing; undersampling; bootstrap; Edgeworth expansion; generalized jackknife; 149

random set; renewal; composition; excursion; local time; 79

rank correlation; semi-parametric model; Sturm-Liouville equations; bivariate normal; copula models; correlation; coupled differential equations; information; maximum correlation; normal scores; projection equations; 55

recurrence; reflecting diffusions; stopping time; strong Feller property; strong Markov property; transience; boundary operator; generator; Lyapunov function; oblique reflection; positive recurrence; 97

reflecting diffusions; stopping time; strong Feller property; strong Markov property; transience; boundary operator; generator; Lyapunov function; oblique reflection; positive recurrence; recurrence; 97

reflections; stochastic differential equations; penalization schemes; 403

regular variation; Tweedie family; exponential dispersion model; Levy-Khinchine representation; Levy measure; natural exponential family; 213

renewal; composition; excursion; local time; random set; 79

resampling; stationary sequence; threshold model; Akaike information criterion; AR(X); ARMA; autoregressive approximation; autoregressive spectrum; blockwise bootstrap; linear process; 123

Richardson extrapolation; strong mixing; undersampling; bootstrap; Edgeworth expansion; generalized jackknife; random fields; 149

round-off errors; stochastic differential equations; functional limit theorems; 1

semi-parametric Cramer-Rao bound; estimation of a density and its derivatives; projection methods; kernel estimators;

semi-parametric model; Sturm-Liouville equations; bivariate normal; copula models; correlation; coupled differential equations; information; maximum correlation; normal scores; projection equations; rank correlation; 55

semi-parametric model; dual geometry; dual parallel transport; efficient score function; estimating function; Hilbert fibred structure; m-curvature free; 29

semi-parametric time series; stationarity; adaptivity; ergodicity; local asymptotic normality; 247

sequential detection; tests of power one; Bayes problem; Brownian motion; change point; 457

spectral analysis; whittle criterion; periodogram; point process; rainfall modelling; 301

spread; finite sample; inequality; nuisance parameters; 323

stationarity; adaptivity; ergodicity; local asymptotic normality; semi-parametric time series; 247

stationary distribution; continuous state space; global random optimization; 415

stationary sequence; threshold model; Akaike information criterion; AR(X); ARMA; autoregressive approximation; autoregressive spectrum; blockwise bootstrap; linear process; resampling; 123

Stein-Chen method; total variation metric, coupling; Dirichlet distribution; Ewens sampling formula; GEM distribution; Poisson approximation; Poisson-Dirichlet distribution; 225

stochastic differential equations; penalization schemes; reflections; 403

stochastic differential equations; Stratonovich intervals; 233

stochastic differential equations; functional limit theorems; round-off errors; 1

stochastic differential equations; boundary value problems; conditional independence; Markov field property; 371

stopping time; strong Feller property; strong Markov property; transience; boundary operator; generator; Lyapunov function; oblique reflection; positive recurrence; recurrence; reflecting diffusions; 97

Stratonovich intervals; stochastic differential equations; 233

strong Feller property; strong Markov property; transience; boundary operator; generator; Lyapunov function; oblique reflection; positive recurrence; recurrence; reflecting diffusions; stopping time; 97

strong Markov property; transience; boundary operator; generator; Lyapunov function; oblique reflection; positive recurrence; recurrence; reflecting diffusions; stopping time; strong Feller property; 97

strong mixing; undersampling; bootstrap; Edgeworth expansion; generalized jackknife; random fields; Richardson extrapolation; 149

studentized means; U-statistics; weakly dependent random variables; absolute regularity; asymptotically normal statistics; Berry-Esseen bounds; functionals of empirical distribution functions; functions of sample means; linear combinations of order statistics; mixing; 329

Sturm-Liouville equations; bivariate normal; copula models; correlation; coupled differential equations; information; maximum correlation; normal scores; projection equations; rank correlation; semi-parametric model; 55

tail index; universal asymptotic normality; asymptotic confidence intervals; asymptotic mean square errors; least-square estimators; 351

tests of power one; Bayes problem; Brownian motion; change point; sequential detection; 457

threshold model; Akaike information criterion; AR(X); ARMA, autoregressive approximation; autoregressive spectrum; blockwise bootstrap; linear process; resampling; stationary sequence; 123

total variation metric; coupling; Dirichlet distribution; Ewens sampling formula; GEM distribution; Poisson approximation; Poisson-Dirichlet distribution; Stein-Chen method; 225

transience; boundary operator; generator; Lyapunov function; oblique reflection; positive recurrence; reflecting diffusions; stopping time; strong Feller property; strong Markov property; 97

Tweedie family; exponential dispersion model; Levy-Khinchine representation; Levy measure; natural exponential family; regular variation; 213

U-statistics; weakly dependent random variables; absolute regularity; asymptotically normal statistics; Berry-Esseen bounds; functionals of empirical distribution functions; functions of sample means; linear combinations of order statistics; mixing; studentized means; 329

undersampling; bootstrap; Edgeworth expansion; generalized jackknife; random fields; Richardson extrapolation; strong mixing; 149

universal asymptotic normality; asymptotic confidence intervals; asymptotic mean square errors; least-square estimators; tail index; 351

weakly dependent random variables; absolute regularity; asymptotically normal statistics; Berry-Esseen bounds; functionals of empirical distribution functions; functions of sample means; linear combinations of order statistics; mixing; studentized means; U-statistics; 329

whittle criterion; periodogram; point process; rainfall modelling; spectral analysis; 301

zero-one law; i.i.d. random variables; large order statistics; 429